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QUALCOMM INCORPORATED 5775 MOREHOUSE DR. SAN DIEGO, CA 92121			LAZARO, DAVID R	
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DATE MAILED: 07/17/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/871,381

Applicant(s)

CHMAYTELLI ET AL.

Examiner

David Lazaro

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 13 April 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-4, 6-10, 20-28 and 42-45 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-4, 6-10, 20-27, 28 and 42-45 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

1. This office action is in response to the amendment filed 04/13/2006.
2. Claims 1-4, 7-10, 20-24, 27, 38, 44 and 45 were amended.
3. Claims 5, 11-19, 28-37 and 39-41 are canceled.
4. Claims 1-4, 6-10, 20-27, 28 and 42-45 are pending in this office action.

Response to Amendment

5. The rejections of claims 7-10 under 35 U.S.C. 112, second paragraph, are withdrawn.
6. Applicant's arguments with respect to claims 1-4, 6-10, 20-27, 28 and 42-45 have been considered but are moot in part in view of the new ground(s) of rejection. Arguments that are still relevant are addressed in the Response to Arguments section below.
7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action.

Claim Objections

8. Claim 44 is objected to because of the following informalities: Claim 44 states "receiving, a wireless device". The examiner believes this was intended to be "receiving, at a wireless device". Appropriate correction is required.

Claim Rejections - 35 USC § 112

9. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

10. Claims 38 and 44 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

Claim 38 contains the limitation "measuring, at a server, a length of time required to receive, at the wireless device, each of the one or more data files sent from the server". Claim 44 contains similar limitations. Applicant's remarks on page 14 of the remarks state that the measurement of a round trip time is not within the scope of this "measuring" limitation. In Applicant's specification, server side measurements are described on pages 15-16. Paragraphs [0071]-[0072] describe the measurement of a round trip time by a server. Particularly, paragraph [0071] states "In one embodiment, the server 204 calculates data transfer rates based on the length of time between sending a data file 208 to a wireless device 222 and receiving notification from the wireless device 222 that the data file 208 was received". Paragraph [0073] states, "the wireless device 222 may notify the server 204 of the total length of time require to download each data file 208 onto the wireless device 222." This is not the same as the

server actually measuring the time required for the server to transmit a file from the server to the client. The server is only receiving a notification of the time required.

As such, the specification does not describe the claimed subject matter in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Therefore claims 38 and 44 fail to comply with the written description requirement.

Claim Rejections - 35 USC § 103

11. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

12. Claims 1-3, 6 and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 5,908,467 by Barrett et al. (Barrett) in view of U.S. Patent 5,968,132 by Tokunaga et al. (Tokunaga) and U.S. Patent 6,928,468 by Leermakers (Leermakers).

13. With respect to Claim 1, Barrett teaches a method for estimating a length of time required to download one or more application programs onto a wireless device over a wireless network (Col. 2 lines 26-35, Col. 4 lines 45-55 and Col. 8 lines 42-50 - the invention is directed towards the internet environment which is described as a composite network including wireless transmission mediums. As such, the apparatus

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taught by Barrett would include wireless devices capable of receiving wireless transmissions.), said method comprising operations of:

the wireless device receiving one or more data files from a server, said data files including at least information representing a size of the one or more application programs available for downloading onto the wireless device (Col. 5 lines 42-67 - response messages are received from the server, the responses may indicate the size of available programs. Note that Col. 4, lines 45-55, discusses the alternate embodiment of remotely stored application programs.);

during the receiving, measuring one or more data transfer rates for the exchanging operation (Col. 5 lines 42-63)

receiving user input of one or more application programs to download (Col. 5 lines 4-10);

at least one of the server and wireless device:

utilizing the one or more measured data transfer rates and the size of the selected one or more application programs to estimate a length of time required to download the one or more application programs onto the wireless device (Col. 5 lines 42-67)

and the wireless device providing an output of the estimated time (Col. 6 lines 1-2; note the output is based on a quantitative measurement - Col. 5 lines 57-67 and Col. 6 lines 25-32).

Barrett does not explicitly disclose that during the exchanging, the server is responsible for measuring one or more data transfer rates for the exchanging operation.

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Tokunaga teaches a server can send exchange data files with a receiving device and can measure a data transfer rate for the exchanging operation (Col. 14 line 53 - Col. 15 line 19).

While Barrett makes quantitative measurements to determine an estimated time (Col. 5 lines 57-67 and Col. 6 lines 25-32), Barrett does not explicitly disclose the output of the estimated time is necessarily a quantitative output. Leermakers teaches a quantitative output of estimated times for corresponding programs (Col. 5 lines 63 - Col. 6 line 3).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Barrett and modify it as indicated by Tokunaga and Leermakers such that the method further comprises during the receiving, the server measuring one or more data transfer rates for the exchanging operation; and the wireless device providing a quantitative output of the estimated time. One would be motivated to have this as there is need for determining download times based on the influence of the amount of traffic between a user and remote server and for giving users an indication of the download times (Col. 5 lines 38-41 and Col. 3 lines 37-67 of Barrett).

14. With respect to Claim 2, Barrett further teaches the wireless device sending one or more requests to the server to obtain the data files from the server (In Barrett: Col. 5 lines 4-23).

15. With respect to Claim 3, Barrett further teaches wherein the data files contain information describing the one or more application programs available for download onto the wireless device (In Barrett: Col. 5 lines 64-66).

16. With respect to Claim 4, Barrett does not explicitly disclose the server transmitting the application programs for download onto the wireless device in response to operation of the wireless device to purchase the one or more application programs.

Leermakers teaches a wireless device, containing data related to one or more application programs available for download and their associated download times (Col. 5 line 63 - Col. 6 line 3), which transmits the application program for download in response to operation of the wireless device to purchase the application programs (Col. 6 lines 60-65).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Barrett in view of Tokunaga and Leermakers such that the method further comprises the server transmitting the application programs for download onto the wireless device in response to operation of the wireless device to purchase the one or more application programs. One would be motivated to have this, as it is desirable to provide users with application programs as a consumer product/service (In Leermakers: Col. 2 lines 54-63 and Col. 6 lines 60-65).

17. With respect to Claim 6, Barrett further teaches the measuring operation comprising operations of: the wireless device notifying the server immediately upon completion of the downloading of each of the one or more data files (In Tokunaga: Col. 15 lines 3-15); and in response, the server dividing a size of each of the one or more

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data files by a length of time between the server sending each data file to the wireless device, and the wireless device notifying the server of the completed download (In Tokunaga: Col. 15 lines 3-19).

18. With respect to Claim 27, Barrett teaches an information exchange system comprising:

wireless device means (Col. 2 lines 26-35, Col. 4 lines 45-55 and Col. 8 lines 42-50 - the invention is directed towards the internet environment which is described as a composite network including wireless transmission mediums. As such, the apparatus taught by Barrett would include wireless devices capable of receiving wireless transmissions.) for performing operations comprising :

receiving one or more data files from a server, said data files including at least information representing a size of one or more application programs available for downloading onto the wireless device (Col. 5 lines 42-67 - test messages and responses are exchanged, the responses may indicate the size of available programs. Note that Col. 4, lines 45-55, discusses the alternate embodiment of remotely stored application programs.);

during the receiving, measuring one or more data transfer rates for the exchanging operation (Col. 5 lines 42-63);

receiving user input of one or more application programs to download (Col. 5 lines 4-10);

utilizing the one or more measured data transfer rates and the size of the selected one or more application programs to estimate a length of time required to

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download the one or more application programs onto the wireless device (Col. 5 lines 42-67);

providing an output of the estimated time (Col. 6 lines 1-2);

and server means for performing operations comprising:

sending the one or more data files with the wireless device (Col. 5 lines 42-67).

Barrett does not explicitly disclose that during the exchanging, the server is responsible for measuring one or more data transfer rates for the exchanging operation. Tokunaga teaches a server can send exchange data files with a receiving device and can measure a data transfer rate for the exchanging operation (Col. 14 line 53 - Col. 15 line 19).

While Barrett makes quantitative measurements to determine an estimated time (Col. 5 lines 57-67 and Col. 6 lines 25-32), Barrett does not explicitly disclose the output of the estimated time is necessarily a quantitative output. Leermakers teaches a quantitative output of estimated times for corresponding programs (Col. 5 lines 63 - Col. 6 line 3).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the system disclosed by Barrett and modify it as indicated by Tokunaga and Leermakers such that the method further comprises during the exchanging, measuring, at the server, one or more data transfer rates for the exchanging operation; and providing an quantitative output of the estimated time. One would be motivated to have this as there is need for determining download times based on the influence of the amount of traffic between a user and remote server and for

giving users an indication of the download times (Col. 5 lines 38-41 and Col. 3 lines 37-67 of Barrett).

19. Claims 7-10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barrett in view of Tokunaga and Leermakers and in further view of U.S. Patent 6,832,239 by Kraft et al. (Kraft).

20. With respect to Claim 7, Barrett in view of Tokunaga and Leermakers teaches all the limitations of Claim 1, but does not explicitly disclose calculating an average data transfer rate by averaging each measured data transfer rate; and dividing the size of the one or more selected application programs by the average data transfer rate.

The examiner takes official notice that calculating the average of a data set is a well known mathematical analysis technique.

Kraft teaches dividing the size of requested data by a data transfer rate in order to estimate a download time (Col. 6 lines 56 - Col. 7 line 6).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Barrett in view of Tokunaga and Leermakers and modify it as indicated such that the method further comprises calculating an average data transfer rate by averaging each measured data transfer rate; and dividing the size of the one or more selected application programs by the average data transfer rate. One would be motivated to use averaging as it is a well known analysis technique. One would be motivated to incorporate the teachings of

Kraft as there is desire for providing users an accurate indication of download time (In Barrett: Col. 3 lines 48-60).

21. With respect to Claim 8, Barrett in view of Tokunaga and Leermakers teaches all the limitations of Claim 1, but does not explicitly disclose calculating a weighted data transfer rate by averaging each measured data transfer rate, giving more weight to the data transfer rates calculated closer in time to the operation of the wireless device to select the one or more application programs for download; and dividing the size of the one or more selected application programs by the weighted data transfer rate.

The examiner takes official notice that calculating the weighted average of a data set is a well known mathematical analysis technique.

Kraft teaches dividing the size of requested data by a data transfer rate in order to estimate a download time (Col. 6 lines 56 - Col. 7 line 6).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Barrett in view of Tokunaga and Leermakers and modify it as indicated such that the method further comprises calculating a weighted data transfer rate by averaging each measured data transfer rate, giving more weight to the data transfer rates calculated closer in time to the operation of the wireless device to select the one or more application programs for download; and dividing the size of the one or more selected application programs by the weighted data transfer rate. One would be motivated to use weighted averaging as it is a well known analysis technique. One would be motivated to incorporate the teachings

of Kraft as there is desire for providing users an accurate indication of download time (In Barrett: Col. 3 lines 48-60).

22. With respect to Claim 9, Barrett in view of Tokunaga and Leermakers teaches all the limitations of Claim 1, but does not explicitly disclose calculating a moving data transfer rate by averaging each measured data transfer rate for a period of time immediately preceding the operation of the wireless device to select the one or more application programs for download; and dividing the size of the one or more selected application programs by the moving data transfer rate.

The examiner takes official notice that calculating the moving average of a data set is a well known mathematical analysis technique.

Kraft teaches dividing the size of requested data by a data transfer rate in order to estimate a download time (Col. 6 lines 56 - Col. 7 line 6).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Barrett in view of Tokunaga and Leermakers and modify it as indicated such that the method further comprises calculating a moving data transfer rate by averaging each measured data transfer rate for a period of time immediately preceding the operation of the wireless device to select the one or more application programs for download; and dividing the size of the one or more selected application programs by the moving data transfer rate. One would be motivated to use moving averaging as it is a well known analysis technique. One would be motivated to incorporate the teachings of Kraft as there is desire for providing users an accurate indication of download time (In Barrett: Col. 3 lines 48-60).

23. With respect to Claim 10, Barrett in view of Tokunaga and Leermakers teaches all the limitations of Claim 1, but does not explicitly disclose calculating a moving weighted data transfer rate by averaging each measured data transfer rate for a period of time immediately preceding the operation of the wireless device to select the one or more application programs for download and giving more weight to the calculated data transfer rates closer in time to the operation of the wireless device to select the one or more application programs for download; and dividing the size of the one or more selected application programs by the moving weighted data transfer rate.

The examiner takes official notice that calculating the moving weighted average of a data set is a well known mathematical analysis technique.

Kraft teaches dividing the size of requested data by a data transfer rate in order to estimate a download time (Col. 6 lines 56 - Col. 7 line 6).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Barrett in view of Tokunaga and Leermakers and modify it as indicated such that the method further comprises calculating a moving weighted data transfer rate by averaging each measured data transfer rate for a period of time immediately preceding the operation of the wireless device to select the one or more application programs for download and giving more weight to the calculated data transfer rates closer in time to the operation of the wireless device to select the one or more application programs for download; and dividing the size of the one or more selected application programs by the moving weighted data transfer rate. One would be motivated to use moving weighted averaging as it is a well

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known analysis technique. One would be motivated to incorporate the teachings of Kraft as there is desire for providing users an accurate indication of download time (In Barrett: Col. 3 lines 48-60).

24. Claims 20-23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barrett in view of Tokunaga and Kraft.

25. With respect to Claim 20, Barrett teaches an information exchange system comprising:

one or more wireless devices programmed to perform operations over a wireless network comprising (Col. 2 lines 26-35, Col. 4 lines 45-55 and Col. 8 lines 42-50 - the invention is directed towards the internet environment which is described as a composite network including wireless transmission mediums. As such, the apparatus taught by Barrett would include wireless devices capable of receiving wireless transmissions.);

receiving one or more data files from a server, said data files including at least information representing a size of one or more application programs available for downloading onto the wireless device. (Col. 5 lines 42-67 - test messages and responses are exchanged, the responses may indicate the size of available programs. Note that Col. 4, lines 45-55, discusses the alternate embodiment of remotely stored application programs.);

receiving user input of one or more selected application programs to download (Col. 5 lines 4-10);

displaying an estimate of time to download the selected application programs from the server (Col. 6 lines 1-2);

providing an output of the estimated time (Col. 6 lines 1-2);

during the receiving by the one or more wireless devices, measuring one or more data transfer rates (Col. 5 lines 42-63);

utilizing the one or more measured data transfer rates and the size of the selected one or more application programs to estimate a length of time required to download the one or more application programs onto the wireless device (Col. 5 lines 42-67);

wherein said time estimate is quantitative (Col. 5 lines 57-67 and Col. 6 lines 25-32 - while the visual representation of the time estimate is qualitative, the actual estimate used to create the visual representation is a quantitative time estimate).

Barrett does not explicitly disclose notifying the server immediately upon completion of the downloading of each of the one or more data files sent from the server; and one or more servers for measuring the data transfer rates during the receiving the receiving by the one or more wireless devices and determining and sending the estimate time length required to download the one or more application programs.

Tokunaga teaches a server can send exchange data files with a receiving device and can measure a data transfer rate for the exchanging operation (Col. 14 line 53 - Col. 15 line 19). This is done in part through the device notifying the server

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immediately upon completion of the downloading of the data file sent from the server (Col. 15 lines 3-15).

Kraft teaches dividing the size of requested data by a data transfer rate in order to estimate a download time and subsequently send the download time estimate to the user (Col. 6 lines 56 - Col. 7 line 24).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the system disclosed by Barrett and modify it as indicated by Tokunaga and Kraft such that the system further comprises notifying the server immediately upon completion of the downloading of the data file sent from the server; receiving user input of one or more selected application programs to download; receiving an estimate of time to download the selected application programs from the server; providing an output of the estimated time; one or more servers, each server programmed to perform operations over a wireless network comprising: during the receiving by the one or more wireless devices, measuring, at the one or more servers, one or more data transfer rates; utilizing the one or more measured data transfer rates and the size of the selected one or more application programs to estimate a length of time required to download the one or more application programs onto the wireless device; and sending the time estimate to the wireless device. One would be motivated to have this as there is need for determining download times based on the influence of the amount of traffic between a user and remote server and for giving users an indication of the download times (Col. 5 lines 38-41 and Col. 3 lines 37-67 of Barrett).

26. With respect to Claim 21, Barrett further teaches the wireless device sending one or more requests to the server to obtain the data files from the server (In Barrett: Col. 5 lines 4-23).

27. With respect to Claim 22, Barrett further teaches the receiving operation comprising: the server initiating a transmission of the data files to the wireless device (In Tokunaga: Col. 14 line 53 - Col. 15 line 19).

28. With respect to Claim 23, Barrett further teaches wherein the operation of the server calculating one or more data transfer rates further comprises: the server dividing a size of each of the one or more data files by a length of time between the server sending each data file to the wireless device, and the wireless device notifying the server of the completed download (In Tokunaga: Col. 14 line 53 - Col. 15 line 19).

29. Claims 24-26 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent 5,908,467 by Barrett et al. (Barrett) in view of U.S. Patent 5,968,132 by Tokunaga et al. (Tokunaga).

30. With respect to Claim 24, Barrett teaches an information exchange system comprising:

one or more wireless devices programmed to perform operations over a wireless network (Col. 2 lines 26-35, Col. 4 lines 45-55 and Col. 8 lines 42-50 - the invention is directed towards the internet environment which is described as a composite network including wireless transmission mediums. As such, the apparatus taught by Barrett

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would include wireless devices capable of receiving wireless transmissions.)

comprising :

receiving one or more data files with a server, said data files including at least information representing a size of one or more application programs available for downloading onto the wireless device (Col. 5 lines 42-67 - test messages and responses are exchanged, the responses may indicate the size of available programs. Note that Col. 4, lines 45-55, discusses the alternate embodiment of remotely stored application programs.);

during the receiving, measuring one or more data transfer rates for the exchanging operation (Col. 5 lines 42-63);

receiving user input of one or more application programs to download (Col. 5 lines 4-10);

utilizing the one or more measured data transfer rates and the size of the selected one or more application programs to estimate a length of time required to download the one or more application programs onto the wireless device (Col. 5 lines 42-67);

providing an output of the estimated time (Col. 6 lines 1-2);

and one or more servers, each server programmed to perform operations over a wireless network, the operations comprising:

sending the one or more data files with the wireless device (Col. 5 lines 42-67).

wherein said time estimate is quantitative (Col. 5 lines 57-67 and Col. 6 lines 25-32 - while the visual representation of the time estimate is qualitative, the actual estimate used to create the visual representation is a quantitative time estimate).

Barrett does not explicitly disclose that during the exchanging, the server is responsible for measuring one or more data transfer rates for the exchanging operation. Tokunaga teaches a server can send exchange data files with a receiving device and can measure a data transfer rate for the exchanging operation (Col. 14 line 53 - Col. 15 line 19).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the system disclosed by Barrett and modify it as indicated by Tokunaga such that the method further comprises during the exchanging, measuring, at the server, one or more data transfer rates for the exchanging operation. One would be motivated to have this as there is need for determining download times based on the influence of the amount of traffic between a user and remote server and for giving users an indication of the download times (Col. 5 lines 38-41 and Col. 3 lines 37-67 of Barrett).

31. With respect to Claim 25, Barrett further teaches the wireless device sending one or more requests to the server to obtain the data files from the server (In Barrett: Col. 5 lines 4-23).

32. With respect to Claim 26, Barrett further teaches, the exchanging operation comprising operations of: the server initiating a transmission of the data files to the wireless device (In Tokunaga: Col. 14 line 53 - Col. 15 line 19).

33. Claims 38 and 42-45 are rejected under 35 U.S.C. 103(a) as being unpatentable over Tokunaga in view of Kraft, Barrett and Leermakers.

34. With respect to Claims 38 and 44, Tokunaga teaches
receiving one or more data files, each containing an associated size field,
wherein each associated size field indicates the size of the data file to which it is
associated (Col. 14 line 53 - Col. 15 line 19);

measuring at a server a length of time required to receive, at the wireless device,
each of the one or more data files sent from the server (Col. 14 line 53 - Col. 15 line 19);

calculating, at the server, a data transfer rate for each of the one or more data
files using the size of each of the one or more data files and the measured length of
time required to receive each of the one or more data files (Col. 14 line 53 - Col. 15 line
19);

calculating, at the server, a combined data transfer rate using the data transfer
rate of each of the one or more data files (Col. 14 line 53 - Col. 15 line 19).

Tokunaga does not explicitly disclose receiving at a wireless device, one or
more data files where one data file contains the size of the download file and estimating,
at the wireless device, the length of time to download the download file using the
combined data transfer rate and the received size of the download file. Kraft teaches
the size of a requested download file and data transfer rate is used to estimate the
length of time to download the download file (Col. 6 lines 56 - Col. 7 line 24). Barrett
teaches receiving the size of a download file at a wireless device, as it is influential on

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determining the download time at the wireless device (Col. 5 lines 64-67 and note Col. 2 lines 26-35, Col. 4 lines 45-55 and Col. 8 lines 42-50 - the invention is directed towards the internet environment which is described as a composite network including wireless transmission mediums. As such, the apparatus taught by Barrett would include wireless devices capable of receiving wireless transmissions.).

Tokunaga does not explicitly disclose outputting, on the wireless device, quantitative indication of the length of time. Leermakers teaches a quantitative output of estimated times for corresponding programs (Col. 5 lines 63 - Col. 6 line 3).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the teachings of Tokunaga and modify them as indicated by Kraft, Barrett and Leermakers such that the method (and corresponding computer readable medium) further comprise receiving, at a wireless device, one or more data files, each containing an associated size field, wherein each associated size field indicates the size of the data file to which it is associated and one data file contains the size of the download file; and estimating at the wireless device, the length of time to download the download file using the combined data transfer rate and the received size of the download file; and outputting, on the wireless device, quantitative indication of the length of time. One would be motivated to have this as it is advantageous to inform the user of an estimated download time (In Kraft: Col. 7 lines 17-30).

35. With respect to Claim 42, Tokunaga in view of Kraft and Barrett teaches all the limitations of Claim 38, but does not explicitly disclose the step of calculating the second data transfer rate is an averaged based on the data transfer rates of the data file and

the one or more second data files. However, the examiner takes official notice that calculating the average of a data set is a well known mathematical analysis technique.

As such, it would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Tokunaga in view of Kraft and Barrett and modify it such that it further comprises the step of calculating the second data transfer rate is an averaged based on the data transfer rates of the data file and the one or more second data files. One would be motivated to use averaging as it is a well known analysis technique.

36. With respect to Claim 43, Tokunaga in view of Kraft and Barrett teaches all the limitations of Claim 38, but does not explicitly disclose the step of calculating the second data transfer rate is time weighted based on a when the data file and the one or more second data files were received. However, the examiner takes official notice that calculating the time weighted average of a data set is a well known mathematical analysis technique.

As such, it would have been obvious to one of ordinary skill in the art at the time the invention was made to take the method disclosed by Tokunaga in view of Kraft and Barrett and modify it such that it further comprises the step of calculating the second data transfer rate is an averaged based on the data transfer rates of the data file and the one or more second data files. One would be motivated to using weighted averaging as it is a well known analysis technique.

37. Claim 45 is rejected under 35 U.S.C. 103(a) as being unpatentable over Tokunaga in view of Kraft and Barrett.

38. With respect to Claim 45, Tokunaga teaches

means for receiving, at a wireless device one or more data files, each containing an associated size field, wherein each associated size field indicates the size of the data file to which it is associated (Col. 14 line 53 - Col. 15 line 19);

means for measuring at a server a length of time required to receive each of the one or more data files (Col. 14 line 53 - Col. 15 line 19);

means for calculating, at the server, a data transfer rate for each of the one or more data files using the size of each of the one or more data files and the measured length of time required to receive each of the one or more data files (Col. 14 line 53 - Col. 15 line 19);

means for calculating, at the server, a combined data transfer rate using the data transfer rate of each of the one or more data files (Col. 14 line 53 - Col. 15 line 19).

Tokunaga does not explicitly disclose receiving at a wireless device, one or more data files where one data file contains the size of the download file and estimating, at the wireless device, the length of time to download the download file using the combined data transfer rate and the received size of the download file. Kraft teaches the size of a requested download file and data transfer rate is used to estimate the length of time to download the download file (Col. 6 lines 56 - Col. 7 line 24). Barrett teaches receiving the size of a download file at a wireless device, as it is influential on determining the download time at the wireless device (Col. 5 lines 64-67 and note Col. 2

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lines 26-35, Col. 4 lines 45-55 and Col. 8 lines 42-50 - the invention is directed towards the internet environment which is described as a composite network including wireless transmission mediums. As such, the apparatus taught by Barrett would include wireless devices capable of receiving wireless transmissions.).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to take the teachings of Tokunaga and modify them as indicated by Kraft and Barrett such that the system further comprise means for receiving, at a wireless device, one or more data files, each containing an associated size field, wherein each associated size field indicates the size of the data file to which it is associated and one data file contains the size of the download file; means for estimating, at the wireless device, the length of time to download the download file using the combined data transfer rate and the received size of the download file. One would be motivated to have this as it is advantageous to inform the user of a estimated download time (In Kraft: Col. 7 lines 17-30).

Response to Arguments

39. Applicant's arguments filed 04/13/2006 have been fully considered but they are not persuasive.

40. Applicants argue on page 13 - "*In fact, Tokunaga discloses a method in which data is sent on a round trip, and thus data is sent by both the server (computer 21) and client (computer 22).*"

a. Examiner's response - In general, each of the independent claims contains subject matter related to a wireless device receiving data files. In a round trip communication between a server and client, the client is still receiving data files. As such, a round trip communication is still within the scope of the claimed subject matter.

While a round trip communication may be involved, the claims make use of the transitional phrase "comprising". As such, the claim is inclusive or open-ended and does not exclude additional, unrecited elements or method steps (MPEP 2111.03).

41. Applicants argue on page 14 - *"Given the disparate purposes, it is respectfully submitted that Barrett and Tokunaga are non-analogous and one skilled in the art would not be motivated to combine these references in the manner suggested by the Office action."*

b. Examiner's response - Barrett and Tokunaga are both related to the issue of determining an estimate of download times based on the influence of the amount of traffic between a user and remote server (In Barrett: Col. 5 lines 38-41 and Col. 3 lines 37-67) *and* (In Tokunaga: Col. 2 lines 40-45 and Col. 15 lines 10-19). As such, the examiner considers the references to be analogous.

Conclusion

42. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to David Lazaro whose telephone number is 571-272-3986. The examiner can normally be reached on 8:30-5:00 M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Saleh Najjar can be reached on 571-272-4006. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR.

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Status information for unpublished applications is available through Private PAIR only.

For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

David Lazaro
July 7, 2006

Bharat Barot
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PRIMARY EXAMINER